



Published in final edited form as:

J Assoc Nurses AIDS Care. 2016 ; 27(3): 285–296. doi:10.1016/j.jana.2015.11.004.

Regulatory Advances in 11 Sub-Saharan Countries in Year 3 of the African Health Profession Regulatory Collaborative for Nurses and Midwives (ARC)

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Abstract

Sub-Saharan Africa carries the greatest burden of the HIV pandemic. Enhancing the supply and use of human resources through policy and regulatory reform is a key action needed to improve the quality of HIV services in this region. In year 3 of the African Health Profession Regulatory Collaborative for Nurses and Midwives (ARC), a President's Emergency Plan for AIDS Relief initiative, 11 country teams of nursing and midwifery leaders ("Quads") received small grants to carry out regulatory improvement projects. Four countries advanced a full stage on the Regulatory Function Framework (RFF), a staged capability maturity model used to evaluate progress in key regulatory functions. While the remaining countries did not advance a full stage on the RFF, important gains were noted. The year-3 evaluation highlighted limitations of the ARC evaluation strategy to capture nuanced progress and provided insight into how the RFF might be adapted for future use.

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Disclosures

The authors report no other real or perceived vested interests that relate to this article that could be construed as a conflict of interest.

Disclaimer

The findings and conclusions in this report are those of the authors and do not necessarily represent the official position of the Centers for Disease Control and Prevention.

Keywords

Africa; HIV; human resources for health; midwifery; nursing; regulation

There were an estimated 1.4 million new HIV infections in sub-Saharan Africa in 2014, accounting for approximately 70% of the new global HIV infections (UNAIDS, 2015). A Global Plan was launched in 2011 to eliminate new HIV infections among children and to keep their mothers alive (UNAIDS, 2011). While significant gains have been made, a number of sub-Saharan countries have registered less than a 30% reduction in new HIV infections among children between 2009 and 2014, and 3.8 million new HIV infections during that period were among women of reproductive age (UNAIDS, 2015).

In order to meet the clinical demands of HIV service delivery, the Global Plan's 10-point action plan recommended enhancing the supply and utilization of human resources for health (HRH) through policy and regulatory reform—including task-shifting measures that allow nurses to perform rapid HIV tests, provide ART prophylaxis, and manage ART (UNAIDS, 2011).

The Global Plan capitalized on the U.S. President's Emergency Plan for AIDS Relief (PEPFAR) efforts to advance task-shifting policies and practice for HIV across the sub-Saharan region (Samb et al., 2007; WHO, 2008). Task shifting, which is defined as the delegation of duties performed by more highly qualified professionals to mid-level or ancillary health care providers, has been recognized as an effective strategy to address HRH shortages in HIV care and treatment (Callaghan, Ford, & Schneider, 2010). The Institute of Medicine (2011) has introduced the term "task sharing" as a more appropriate designation for clinical tasks that are "shared" by health professions. Accordingly, "task sharing" will be used in place of "task shifting" throughout the remainder of this article.

Nurse-initiated and -managed antiretroviral therapy (NIMART) is a specific example of successful task sharing; numerous studies confirm noninferiority of NIMART regarding patient outcomes and quality of clinical care in certain settings (Bhanbhro, 2011; Callaghan et al., 2010; Chimbwandira, Mhango, & Makombe, 2013; Fairall et al., 2012; Kiweewa et al., 2013; Monyatsi et al., 2011; Penazzato, Davies, Apollo, Negussie, & Ford, 2014; Sanne et al., 2010; Shumbusho et al., 2009). A recent NIMART survey of countries from eastern and southern Africa found that 7 of 11 countries reported having some form of task-sharing policy on record (Zuber, McCarthy, Verani, Msidi, & Johnson, 2014).

Over the past few years, PEPFAR (2015) has continued to advance task-shared models of HIV service delivery by providing significant support to strengthen the regulatory capacity of key clinical cadres, such as physicians, nurses, and clinical officers. Regulatory oversight of health professionals is central to the safe and effective expansion of access to task-shared HIV services. Health professions councils, such as nursing councils, are typically responsible for issuing and updating policy, practice, and regulatory standards through activities such as scope of practice expansion, authorization of NIMART, standardization of in-service trainings, accreditation of preservice curricula, and provision of routine re-licensure requirements (McCarthy, Kelley, Verani, St. Louis, & Riley, 2014). As the largest

segment of the health workforce, nurses can effectively contribute to strategic planning for and implementation of task-shared HIV services.

In 2011, the U.S. Centers for Disease Control and Prevention (CDC), with funding from PEPFAR, began an innovative 4-year initiative, the African Health Profession Regulatory Collaborative for Nurses and Midwives (ARC), to strengthen nursing regulation. The ARC convened nursing and midwifery leadership from 17 countries in East, Central, and Southern Africa (ECSA) in a crosscountry collaboration that targeted national issues affecting the health workforce (McCarthy & Riley, 2012). Key components of the ARC approach included formal learning sessions of nurse and midwifery leaders three times per year to promote south-to-south learning and to provide funding and technical assistance for country-driven small grant projects (McCarthy & Riley, 2012). Nursing leaders from each country formed a country team, known as a “Quad,” which was composed of a representative from the Ministry of Health (MOH), academia, professional regulatory bodies, and the national nursing professional association. Each learning session was linked with action periods of 2 to 3 months, during which individual country Quads worked toward their predetermined project goals.

The conceptual framework for ARC-ECSA was adapted from the Institute for Healthcare Improvement model for breakthrough organization change (McCarthy et al., 2014). The framework allows interested groups to learn from each other and from recognized experts in topic areas through a quality improvement approach. The goal of this 4-year initiative was focused on strengthening professional regulation through south-to-south sharing (McCarthy & Riley, 2012).

In the first 2 years of the ARC, 8 of the 11 ARC-ECSA countries (year 1: 4 of 5; year 2: 4 of 6) advanced at least one full stage in regulatory function as a result of their Quad small grants projects and technical assistance (McCarthy et al., 2014). An evaluation framework, which will be further elaborated upon in this paper, defined stages of regulatory capacity. In year 3, grants were designed to explicitly link regulatory strengthening with HIV service delivery; this shift to more directly link regulation and HIV service delivery was reflected in the meeting objectives and agenda of the 2013 Summative Congress (Table 1). The 2013 Summative Congress agenda included small group work and multi-country professional work and discussion, presentations on the most recent HIV clinical management, and panels featuring guest lecturers. For example, participants received formal presentations on the WHO 2013 consolidated guidelines on the use of ART to treat and prevent HIV and WHO updates on the clinical management of prevention of mother-to-child transmission of HIV (PMTCT) and HRH program recommendations regarding task-sharing.

Methods

Data Collection Tool

The primary method used to evaluate the ARC initiative at the end of year 3 was the Regulatory Function Framework (RFF; McCarthy et al., 2014). The RFF is a novel evaluation tool developed to measure the impact and effectiveness of ARC country projects from year to year. The RFF is an adaptation of the staged Capability Maturity Model

(Humphrey, 1987) that included seven key regulatory functions and described five stages of advancement for each function from an early stage to a mature stage (Table 2). Progression through the maturity stages is linear where elements within a given stage are foundational to movement to the next stage (Paulk, Weber, Curtis, & Chrissis, 1994). In this way, advancing from one stage to the next represents a meaningful improvement in that regulatory function. Nursing and midwifery leaders validated the RFF during the first year of the ARC initiative, and changes were made to the RFF based on recommendations gained through the validation process. Countries were not expected to move a full stage on the RFF each year given the often-lengthy nature of achieving policy and regulatory changes that impact implementation of country projects. It was expected, however, that all countries in the collaborative would have progressed at least one stage by the end of the 4-year ARC initiative.

Data Collection

At the beginning of the ARC year-3 cycle, members of the Quads from the 17 ARC ECSA countries completed the RFF survey in their country groups while attending the Summative Congress held in Kenya in July 2013. The ARC faculty met with each country team to ensure clarity of the information being requested. This process was repeated at the Summative Congress held in Namibia in February 2015 at the onset of the ARC year-4 cycle in order to compare stages of RFF maturity before and after implementation of year-3 country projects. The Quads were instructed to work together as teams to complete the RFF for their countries using group discussion to reach consensus on the stage of maturity for each RFF function; the Quads were instructed to circle the agreed-upon stage once consensus was reached. Assessing ARC impact through the RFF was determined to be nonresearch by the CDC Associate Director for Science Office; as such, it did not require agency review. The process for obtaining informed consent to conduct the interviews from nursing teams adhered to the original guidance when it was introduced in 2012. Prior to data collection, an information sheet was read to participants and they provided verbal informed consent.

Analysis

The completed RFF tools from both years were reviewed for completeness. It was noted through this review process that the Quads used multiple methods to report their RFF stages, including circling or underlining an option and placing check marks, asterisks, and/or "Xs" next to individual elements within stages. Due to the variation between Quads in completion of the RFF tool, a data reconciliation process was used to reduce bias in interpretation of the RFF results. Two ARC faculty members independently assessed the completed RFF tools to determine which stage the Quads reported reaching, and results were compared. Eight disparate cases (where faculty members interpreted results differently) out of a total of 117 cases were reconciled through discussion and consensus. Once consensus was reached for all data points; data were entered into an Excel spreadsheet (Microsoft Corporation, Redmond, WA).

Results

Eleven of the 17 ARC countries received grants for year 3 of the ARC initiative (Table 3). Three country projects focused on continuing professional development (CPD), four on scope of practice, one on licensure, two projects had a combined focus on CPD and licensure, and one project had a combined focus on accreditation of preservice education and licensure.

Four of the ARC countries that received grants in year 3 advanced a full RFF stage from the beginning of year 3 to the beginning of year 4 (Figure 1). South Africa advanced from Stage 1 to 2 on the CPD function with the development and approval of a national CPD framework for nurses and midwives. Similarly, Zambia progressed from Stage 1 to 2 on CPD through development of a national CPD framework and logbook for nurses and midwives. Namibia advanced from Stage 3 to 4 on CPD by developing a framework to improve nursing CPD. Finally, Lesotho advanced from Stage 4 to 5 by monitoring compliance of CPD requirements for nurse licensure renewal.

The remaining seven countries did not advance a full RFF stage during the project year. However, it should be noted that progress was made, as evidenced by the achievement of smaller steps within the stages (Table 3). Of these countries, Mozambique, South Sudan, and Uganda began and ended the year-3 cycle in Stage 1, while Swaziland, Seychelles, and Botswana began and ended the year-3 cycle in Stage 2, and Rwanda began and ended the year-3 cycle in Stage 3.

Discussion

Findings from the ARC Year 3 evaluation highlight continued and significant regulatory progress by nursing and midwifery teams across the 17 country region. Four of 11 countries funded in Year 3 advanced a full stage in regulatory function, a major achievement given that there are only five stages in this capability maturity model (Figure 1). Significant improvements in regulatory functionality were made in all 11 countries funded in Year 3, with expected positive impacts on quantity and quality of HIV prevention, care, and treatment services (Table 3). Full stage advances on the RFF were somewhat slower in Year 3 (4 of 11) than in previous years (Year 1: 4 of 5; Year 2: 4 of 6), perhaps due to the closer tie of nursing regulatory projects to HIV service delivery. Changes to the ARC evaluation strategy, including the development of a capability maturity model to measure the quality of nurse- and midwife-led HIV services, will better capture these impacts in future years of the project.

Factors Contributing to Regulatory Advancement

Key factors contributed to regulatory advances in the four countries that advanced a full RFF step during year 3 of the ARC. First, strong team stability, cohesion, and commitment were noted in each of the four country teams. Each of these teams had also been working together through the ARC for at least 2 years, had clarified and come to understand each other's roles, had learned how to work with each other collaboratively, and had given personal time to ensure that the project objectives were achieved. In addition, each of the four Quads had

an established foundation of collaborative project success, which made them more effective at project design and implementation in year 3. For example, the Lesotho Quad had several years of experience developing and managing a CPD project. Similarly, the Zambia Quad had designed the national CPD framework in the years prior to being awarded their year-3 grant.

Additional key factors that contributed to a country team's regulatory advances included south-to-south learning, technical assistance, and engagement with and support from ARC key stakeholders. The ARC strategy of south-to-south learning enabled country teams to draw on the experiences and lessons learned from other Quads. South Africa and Zambia, for example, benefited from learning about the experiences from the Lesotho, Swaziland, and Botswana Quads while they were developing their national CPD frameworks. Several countries used and adapted a nursing-needs assessment form that the Tanzania Quad had developed in year 2. Additionally, the four country teams that advanced furthest received intensive technical assistance during year 3. Each country team also built an extended Quad support network within their respective countries, referred to as the "Quad plus," of up to 20 people they relied on for support and advice. Furthermore, government-level project support played an important role in RFF advances evidenced by acceptance of Quad members spending "in-kind" time on the projects. This high-level government support conveyed an understanding that what the Quad was trying to achieve was beneficial to the country.

Evaluation Factors Contributing to Limited Regulatory Advances

A key factor that likely contributed to limited RFF advances in seven ARC countries (in comparison to the first 2 years of the ARC initiative) was the added requirement of year-3 grants to link regulatory strengthening to HIV service delivery. The RFF had less capacity to capture nuanced advances because it was not originally designed with an HIV service delivery perspective. Several of the country projects that did not advance a full RFF stage still made important gains on HIV-specific aims. For example, the Botswana Quad analyzed results from a Nurse and Midwife HIV Gap Survey and incorporated the findings into a CPD framework. In addition, Swaziland conducted a needs assessment survey of nurse and midwife satisfaction on performance and knowledge of HIV and used the results to inform the development of competencies for nursing education programs. Lastly, Seychelles organized a job analysis workshop to evaluate nurse and midwife roles and to identify new competencies; information gained contributed to the development of a scope of practice for HIV infection.

Limitations

The RFF is a self-evaluation tool, with an inherent potential for bias. For example, country teams may have felt pressure to report higher RFF scores than what was factual in order to put their country or Quad team in a more positive light. Also, during the project period, some leadership changes within the Quads occurred that may have influenced the comparability of before-and-after scoring on the RFF. Finally, despite undergoing data reconciliation by two ARC faculty members, multiple methods for reporting RFF stages may have influenced the interpretation of some results.

Lessons Learned

The usefulness and quality of ARC data can be improved by revising the existing RFF and by developing and implementing new data collection tools. When the RFF was first developed, it lacked a built-in process for reviewing and evaluating RFF findings against the year-to-year progress of country teams. This has resulted in a static evaluation tool that did not evolve with lessons learned or as the aims and scope of the ARC expanded. Efforts will be made in the coming year to critically evaluate and revise the RFF, as needed, in an effort to make the document more dynamic and better able to capture nuanced regulatory advancements. In addition, given the shift in increased focus of the ARC on HIV service delivery, a new capability maturity model is now being developed to measure maturity and advances in quality of nurse- and midwife-led HIV service delivery.

The ARC evaluation strategy also did not formally include the evaluation of the impact of teamwork and the fostering of intra- and interorganizational relationships, both of which are integral components of an effective quality improvement collaborative. While these constructs are frequently overlooked in project evaluations and publications, research has demonstrated that effective teamwork is integral to the success of collaborative work and for improving group performance (Hamilton, Nickerson, & Owan, 2003; Middleton, 2012; Montes, Moreno, & Morales, 2005; Woolley, Chabris, Pentland, Hashmi, & Malone, 2010). Activities of the Mozambique Quad in year 3, for example, led the MOH to use Mozambique National Association of Nurses (Associação Nacional dos Enfermeiros de Moçambique [ANEMO])-approved evaluation tools in the national nursing exam for the first time ever, and the MOH recognizing the ANEMO role in safeguarding the quality of preservice training and service delivery. Given our anecdotal observations of the importance of teamwork and organizational ties on Quad project success, consideration is now being given to how these constructs can be best captured through the development of a new ARC qualitative evaluation tool.

Looking Ahead With the ARC

In year 4 of ARC, 11 countries have received small grants to address regulatory bottlenecks that directly impact HIV service provision scale up. Of these countries, nine will focus on programs for CPD with proposed activities ranging from development of a national CPD framework to integrating mandatory HIV content into a preexisting program. One country Quad will revise their national nursing and midwifery scope of practice, while another country team will enhance their preservice nursing education program.

Most recently, in year 4, the ARC expanded its geographic focus by establishing a collaborative for three countries in west and central Africa: Côte d'Ivoire, Democratic Republic of Congo, and Cameroon (ARC West and Central). This extension of the initiative focuses specifically on improving the quality of nurse- and midwife-led PMTCT and pediatric HIV care and treatment in high-volume facilities. The evaluations for year 4 of the original ARC countries and year 1 of ARC West and Central will incorporate the newly developed processes for quality data collection and evaluation tools described above.

Conclusions

The ARC initiative has demonstrated that sustained investment in a south-to-south, regional collaboration can yield important and measurable impacts on health workforce regulation. These advances are integral to nationally owned quality assurance for HIV service delivery and increased access to HIV testing and treatment through task sharing. By establishing CPD programs, expanding scopes of practice, updating and revising preservice and licensure requirements, and addressing other regulatory priorities, the nurse and midwifery leaders participating in the ARC have contributed in meaningful ways to their countries' attainment of the UNAIDS (2014b) 90-90-90 targets: by 2020, 90% of all people living with HIV will know their HIV status, 90% of all people with diagnosed HIV infection will receive sustained ART, and 90% of all people receiving ART will have viral suppression. As nurses and midwives comprise the largest health care cadre across Africa (Kinfu, Poz, Mercer, & Evans, 2009), capacitating this important workforce is essential for advancing the PEPFAR (2015) agenda.

Acknowledgments

The authors would like to acknowledge the contributions of the Nell Hodgson Woodruff School of Nursing, Emory University, the Commonwealth Nurses and Midwives Federation, the East, Central, and Southern Africa College of Nursing, guest faculty from the Centers for Disease Control and Prevention Division of Global HIV and TB, CDC staff from those countries whose progress is described in this paper, including Trong Ao, Alex Bolo, Amy Boore, Deborah Conner, Nancy Knight, Samuel Malamba, Andre Pelletier, Dmitri Prybylski, Wandani Sebonego, Fatma Soud, and Alfredo Vergara, and the dedicated "Quads" of nurse and midwife leaders in the 17 participating countries of East, Central, and Southern Africa. These nursing and midwifery leaders continue to demonstrate that their efforts have not only improved the regulation, education, and practice of nursing and midwifery in their countries, but they have also significantly improved the capacity of their nursing workforces to provide quality care for people living with HIV. More information on the work of the Quads can be found on the ARC Web site at <http://www.africanregulatorycollaborative.com>.

The African Health Profession Regulatory Collaborative for Nurses and Midwives (ARC) is funded by the Centers for Disease Control and Prevention (Cooperative Agreement #5U36) E000002-02), with support from the United States President's Emergency Plan for AIDS Relief. Carla Johnson is a member of the Association of Nurses in AIDS Care Global HIV Nursing Committee.

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Key Considerations

- The African Health Profession Regulatory Collaborative (ARC) for Nurses and Midwives has employed an innovative measurement tool, the Regulatory Functions Framework, to assess advances in regulatory frameworks across 17 countries in sub-Saharan Africa.
- In years 1 to 3 of the ARC, all countries measurably strengthened their regulatory frameworks.
- The year-3 evaluation highlighted how the ARC evaluation strategy might be adapted and improved for future use including development of tools to measure the quality of nurse- and midwife-led HIV services and inter- and intraorganizational collaboration.
- Capacitating the nursing and midwifery workforce through regulatory advances is globally recommended and essential to improve access to and quality of HIV care.

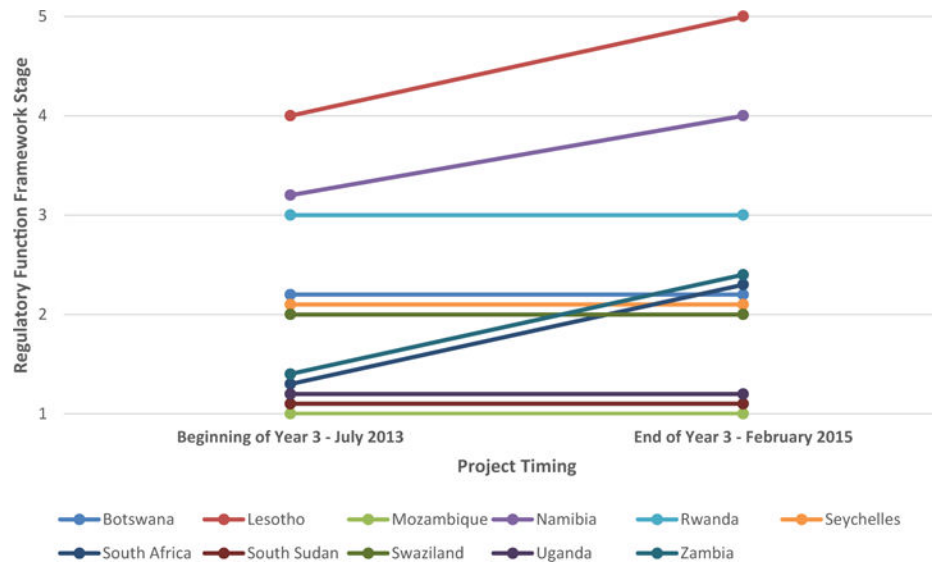


Figure 1.

Stages on the Regulatory Function Framework (RFF) for year-3 ARC projects by country and year. *Note.* ARC = African Health Profession Regulatory Collaborative for Nurses and Midwives. This Figure is available in color online at www.nursesinaidscarejournal.org.

Table 1**African Health Profession Regulatory Collaborative for Nurses and Midwives, 2013 Summative Congress objectives**

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- 1) To provide assistance and technical support to countries to develop project ideas for ARC grant proposals that address regulatory issues to facilitate the expansion of HIV services.
 - 2) To **facilitate regional dialogue** on lessons learned and share best practices in nursing and midwifery legislation, education standards, and practice regulation.
 - 3) To **foster collaboration** between nursing and midwifery stakeholders in each country and advance collaborative leadership skills.
 - 4) To **promote networking** by nursing and midwifery leaders in the ECSA region and sharing of best practices in nursing regulation between countries.
 - 5) To **disseminate WHO norms, standards, and guidelines** on professional health education, training, and professional regulation, and to receive feedback from participants.
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Note. ARC = African Health Profession Regulatory Collaborative for Nurses and Midwives; ECSA = Eastern, Central, and Southern Africa; WHO = World Health Organization.

Table 2

The ARC Regulatory Function Framework (RFF)

	STAGE 1	STAGE 2	STAGE 3	STAGE 4	STAGE 5
Nursing and Midwifery Legislation	Identification of key issues with participation of stakeholders. Consensus related to whether a new nursing and midwifery act or amendments to existing legislation are needed.	Legislation drafted with stakeholders including Ministry of Health, nursing and midwifery council, and/or professional associations, academia, and legislature or parliament.	Approval, commencement, and publication of legislation.	Implementation via dissemination and training of nurses and midwives on rights and duties. Councils and/or Ministry of Health issue rules or regulations.	Monitoring and evaluation of compliance and impact.
Registration System and Use of Registration Data	Registration is not legally required for nurses and midwives to practice or Registration is life long (i.e., renewal not required). The register is primarily a paper-based system.	Renewal of registration (or license) is required. Both paper and electronic (e.g., Excel) system for registration are used. Registration system can answer basic queries (e.g., number of midwives in the country).	Registration system (including licensure and re-licensure) is primarily electronic (use of software). Database includes all public sector nurses and is regularly updated. Registration system can be queried to generate workforce reports.	Registration system is completely electronic and includes all public- and private-sector nurses. Database displays various registration statuses of nurses and midwives. Database can be programmed to automatically generate workforce reports.	Registration, licensure, and re-licensure services are available online or are decentralized. Registration database can exchange data with other health information systems. Registration data used by decision-makers for workforce policy and planning.
Licensure Process	Licenses not required to practice	Licenses are issued with initial registration (no separate licensure examination). Renewal of license is required at intervals specified by the regulatory authority.	An examination or assessment process is in place for initial registration and licensure. The examination or assessment is paper-based. National competency standards are being developed.	Examination or assessment content meets national competency standards. Various statuses of licenses issued (i.e., conditional, suspended). Licensure verification process facilitates entry of foreign educated nurses/midwives into workforce.	Registration and initial licensure examination content is updated regularly. Examination content aligns with global guidelines or regional competency standards. The licensure status of a nurse or midwife is available to the public via Web site or viewing in person.
Scope of Practice (SOP)	SOP not defined by legal statute or regulation. SOP may be decided by the employer or based on health facility needs.	Council has the authority to formally define the SOP. SOPs are under development. SOP reviewed or revised within 10 years.	Nationally standardized SOP for all nurse and midwife categories. SOP is based on nursing/ midwifery job descriptions. SOP reviewed or revised within previous 5 years.	SOP includes essential nursing/ midwifery competencies. The SOPs are regularly and systematically reviewed and revised. SOPs allow individuals to make decisions about task shifting or task sharing.	All SOPs align with global guidelines and standards for nursing and midwifery. SOPs reviewed and revised according to global standards. SOPs are dynamic, flexible, and inclusive, not restrictive.
Continuing Professional Development (CPD)	CPD is voluntary. CPD framework for nursing and midwifery may be in planning stages.	Council has a mandate in legislation to require CPD. National CPD framework for nursing and midwifery are developed. Implementation of CPD requirement is in pilot or early stages.	CPD program for nurses and midwives is finalized and nationally disseminated. CPD is officially required for re-licensure. Strategy in place to track compliance.	Electronic system in place to monitor CPD compliance. Penalties for noncompliance with CPD exist. Available CPD includes content on national HIV service delivery guidelines for nurses and midwives.	Multiple types of CPD are available, including Web-based and mobile-based models. CPD content aligns with regional standards or global guidelines. Regular evaluations of CPD program carried out.

	STAGE 1	STAGE 2	STAGE 3	STAGE 4	STAGE 5
Accreditation of Pre-Service Education	Council does not have legal authority to approve preservice nursing/ midwifery schools or programs. Public schools/programs may be “endorsed” by the council.	Council has legal authority to approve preservice schools/ programs. Council issues standards for accreditation of nursing schools/ programs. No time limit or expiration date on accreditation approval.	Initial assessment visits are carried out by the council or their designated authority. Standards for accreditation are regularly reviewed and revised. Requirement for accreditation renewal is enforced.	Assessment visits are regularly carried out by an independent body. Council has an electronic system to track accreditation status. Various levels of accreditation granted (i.e., probationary, conditional).	Group independent from council makes accreditation determination for both public and private schools/programs. Accreditation standards align with global or regional guidelines. Accreditation status available to the public.
Professional Misconduct and Disciplinary Powers	Council does not have authority to manage complaints and impose sanctions. Standards of professional conduct may not be defined.	Legislation authorizes council to define standards for professional conduct. Council has authority to investigate or initiate inquiries into professional misconduct. Basic types of complaints and sanctions exist.	Complaints investigation and misconduct hearings are separate processes. A range of disciplinary measures (penalties, sanctions, conditions) exist. Appeals processes are available and accessible.	The processes and documentation of complaints and sanctions are transparent. Processes and timelines are in place to review and remove penalties and sanctions. Processes are in place for members of the public to lodge a complaint.	Professional conduct standards align with regional standards or global guidelines. The complaint management process is regularly evaluated for transparency and timeliness. Information on complaints and sanctions is available to the public.

Note. ARC = African Health Profession Regulatory Collaborative for Nurses and Midwives; CPD = Continuing Professional Development; LIC = Licensure; MOH = Ministry of Health; NIMART = Nurse Initiated and Managed Antiretroviral Therapy; PMTCT = prevention of mother-to-child transmission; RFF = Regulatory Function Framework; SOP = Scope of Practice. Reprinted with permission from Elsevier. Reference: McCarthy, C. F., Kelley, M. A., Verani, A. R., St Louis, M. E., & Riley, P. L. (2014). Development of a framework to measure health profession regulation strengthening. *Evaluation and Program Planning*, 46, 17–24.

Table 3

African Health Profession Regulatory Collaborative for Nurses and Midwives Year-3 Project Achievements by Country and Regulatory Function Framework Focus

Country	RFF Focus	ARC Year-3 Project Achievements
Botswana	CPD	<ul style="list-style-type: none"> Analyzed HIV Gap survey data for nurses and midwives and used results to link CPD program to HIV service delivery Conducted a training of trainers workshop for CPD dissemination Briefed the Council and handed the CPD program over to the Nursing and Midwifery Council of Botswana
Lesotho	CPD and LIC	<ul style="list-style-type: none"> Revised CPD Framework and Logbook to include HIV content and disseminated to nurses and midwives Trained CPD focal persons, nurses, midwives, and nursing assistants Developed application forms for Accreditation of CPD providers and content, penalties for noncompliance, and CPD Monitoring and Evaluation Tool Monitored compliance of CPD requirements for nurse licensure renewal
Mozambique	ACCR and LIC	<ul style="list-style-type: none"> Established a partnership between the Mozambique National Association of Nurses (ANEMO) and the MOH Facilitated ANEMO participation in the training process for the national exam of nurses for the first time Facilitated the MOH first-ever use of ANEMO-approved evaluation tools in the national exam
Namibia	CPD	<ul style="list-style-type: none"> Collected and analyzed baseline data on PMTCT knowledge and skills, CPD compliance, and challenges related to accumulating continuing education units for nurses Developed a framework for CPD improvement to improve CPD compliance and ensured continuous registration of nurses
Rwanda	SOP	<ul style="list-style-type: none"> Reviewed and revised the SOP to include HIV management and treatment Defined the profile of nurses and midwives to be trained in HIV management and treatment Developing a CPD module on HIV management and treatment
Seychelles	SOP	<ul style="list-style-type: none"> Organized a job analysis workshop to evaluate nurse and midwife roles in HIV service delivery Developed SOP for HIV and tools for SOP evaluation Held a workshop for validation of SOP Developed an HIV training program
South Africa	CPD	<ul style="list-style-type: none"> Reviewed the first draft of the CPD Framework and drafted the second draft following consultative workshops Submitted the CPD Framework to and received approval from the Laws, Practice, and Standards Committee Conducted a survey of the current practices in NIMART training programs Developed accreditation guidelines for HIV management program
South Sudan	SOP	<ul style="list-style-type: none"> Conducted facility assessments on nurse and midwife HIV knowledge and Option B + service delivery Drafted and validated a Scope of Practice for nurses and midwives Conducted an innovative radio program to increase awareness of the Option B + SOP for nurses and midwives
Swaziland	LIC	<ul style="list-style-type: none"> Conducted a survey of satisfaction on performance and knowledge of HIV with 279 nurses

Country	RFF Focus	ARC Year-3 Project Achievements
		<ul style="list-style-type: none"> Analyzed survey results and used findings to develop competencies with HIV-related competencies included Developed competency tools for nursing programs
Uganda	SOP	<ul style="list-style-type: none"> Analyzed data on SOP of different cadres of nurses and midwives Developed and validated a draft SOP for nurses and midwives with HIV services included
Zambia	CPS and LIC	<ul style="list-style-type: none"> Formed a CPD Technical Working Group and oriented the group to Option B + Developed and piloted Option B + e-modules for nurses and midwives Developed a CPD needs assessment protocol; collected and analyzed CPD data from 297 nurses and midwives Developed a CPD framework and logbook

Note. ACCR = accreditation; ARC = African Health Profession Regulatory Collaborative for Nurses and Midwives; CPD = continuing professional development; LIC = licensure; MOH = Ministry of Health; NIMART = nurse-initiated and -managed antiretroviral therapy; PMTCT = prevention of mother-to-child transmission; RFF = regulatory function framework; SOP = scope of practice.